

Amendments to the Claims:

This listing of claims will replace all prior versions, and listings, of claims in the application:

Listing of Claims:

Claim 1 (currently amended). A fire ~~Fire~~ detector, comprising an insertable detector assembly which includes a sensor arrangement (2) and an electronic evaluation system, and ~~comprising~~ a housing (3) which surrounds the sensor arrangement (2) and has openings to provide access by air and, when applicable, smoke to the sensor arrangement (2), ~~characterised in that~~ wherein the detector is of modular construction and is configured to accommodate detector modules having sensors (11, 12, 12', 24) for different fire parameters, all detection modules being compatible with a single housing (3).

Claim 2 (currently amended). The fire ~~Fire~~ detector ~~according to~~ of claim 1, ~~characterised in that~~ wherein the sensor arrangement (2) and the ~~above-mentioned~~ access openings are arranged substantially in one plane.

Claim 3 (currently amended). The fire ~~Fire~~ detector ~~according to~~ of claim 2, ~~characterised in that~~ wherein the detection modules have an identical carrier plate (6) for all detector types, which carrier plate (6) is insertable in the detector and is configured to accommodate the sensors (11, 12, 12', 24) for the different fire parameters.

Claim 4 (currently amended). ~~The fire~~ Fire detector according to of claim 3, ~~characterised in that wherein~~ the carrier plate (6) includes, on its underside facing towards ~~the~~ a detector cap, housings (13, 14, 15) for accommodating components of an electro-optical sensor system (2) and is configured on its upper side for mounting a printed circuit board (8) carrying the electronic evaluation system.

Claim 5 (currently amended). ~~The fire~~ Fire detector according to of claim 2 4, ~~characterised in that wherein~~ the housing (3) includes a detector hood (17) ~~which consists of comprising~~ an annular upper part and a lower part spaced therefrom and forming the cap of the detector.

Claim 6 (currently amended). ~~The fire~~ Fire detector according to of claim 5, ~~characterised in that wherein a~~ the gap (19) between the two parts of the detector hood (17) forms the ~~above-mentioned~~ access openings and the ~~above-mentioned~~ lower part is connected to the upper part by ~~arcuate or rib-like~~ bridges (18).

Claim 7 (currently amended). ~~The fire~~ Fire detector according to ~~anyone of claims~~ claim 4 to 6, ~~characterised in that and further comprising~~ an optical detection module for measuring scattered light caused by smoke ~~is provided, which detection module includes including~~ at least one light source (12, 12'), a light detector (11), a measuring chamber and a labyrinth system (7) having screens (16) arranged at its periphery, the at least one light source (12, 12') and the light detector (11) being fixed in the housings (14, 15; 13) on the underside of the carrier plate (6) and the labyrinth system (7) being formed in the manner of a cover and being fixable to the carrier plate (6).

Claim 8 (currently amended). ~~The fire~~ Fire detector according to ~~anyone of claims~~ 4 to claim 6, ~~characterised in that there is provided further comprising~~ a thermal detection module having two temperature sensors (24) which are fixed to the printed circuit board (8) radially opposite one another and project downwardly from the latter through the carrier plate (6).

Claim 9 (currently amended). ~~The fire~~ Fire detector ~~according to of~~ claims 6 and claim 8, ~~characterised in that the above-mentioned wherein the~~ bridges (18) are configured in the form of wings or straps having a vertically disposed opening (25) and are provided in an even number, and in that the temperature sensors (24) project from above towards one of the bridges (18) in each case in such a way that their free ends are located directly in or behind the opening (25).

Claim 10 (currently amended). ~~The fire~~ Fire detector ~~according to of~~ claims 4 and claim 9, ~~characterised in that wherein the~~ thermal detection module has a cover plate (26) fixable to the carrier plate (6) for covering the housings (13,14,15) which are provided for the electro-optical sensor system (2), and in that openings through which the temperature sensors (24) can pass are provided in the ~~covering~~ cover plate (26) and a dividing wall (31) for effecting a directed air-flow is provided between the temperature sensors (24) and is disposed in a radial direction.

Claim 11 (currently amended). ~~The fire~~ Fire detector ~~according to anyone of~~ claims 4 to claim 6, ~~characterised in that further comprising~~ an optical-thermal detection module for measuring scattered light caused by smoke and for measuring temperature ~~is provided~~, which detection module includes ~~an~~ the electro-optical sensor system (2) and two temperature sensors (24), the latter being arranged laterally beside the optical sensor system (2).

Claim 12 (currently amended). ~~The fire~~ Fire detector ~~according to of~~ claims 4, 6 and claim 11, ~~characterised in that wherein the~~ temperature sensors (24) are fixed to the printed circuit board (8) radially opposite one another and their free ends are located in the vicinity of the ~~above-mentioned~~ bridges (18).

Claim 13 (currently amended). ~~The fire~~ Fire detector according to ~~of~~ claim 9 ~~or~~ 12, characterised in that wherein the bridges (18) are so configured that, ~~firstly,~~ they protect the temperature sensors (24) from mechanical influences and, ~~secondly,~~ they ensure air-flow to the temperature sensors (24) which is substantially as undisturbed as possible.

Claim 14 (currently amended). ~~The fire~~ Fire detector according to ~~of~~ claims 4 and 5 claim 7, characterised in that further comprising a light guide (22) is fixed to the base of the labyrinth system (7), which light guide (22) extends upwardly to the printed circuit board (8) and forms part of an alarm display visible in the region of the apex of the detector.

Claim 15 (currently amended). ~~The fire~~ Fire detector according to ~~anyone of~~ claims 1 to claim 14, characterised by further comprising a base (1) associated with the housing of the fire detector and having a multi-pole connector (4), and by a multiple plug (5) arranged in the housing of the fire detector and insertable tangentially in the multi-pole connector (4) by rotating the housing of the detector relatively to the base (1).

Claim 16 (currently amended). ~~The fire~~ Fire detector according to ~~of~~ claims 4 and claim 15, characterised in that wherein the multiple plug (5) is integrated in the carrier plate (16) using insert technology.

Claim 17 (currently amended). ~~The fire~~ Fire detector according to ~~anyone of~~ claims 1 to claim 16, characterised in that further comprising an alarm module having an acoustic alarm emitter ~~is provided which is~~ arranged in a separate housing offset from the housing of the fire detector and preferably arranged laterally beside the latter or moulded therewith.

Claim 18 (new). The fire detector of claim 9, wherein the bridges are so configured that they protect the temperature sensors from mechanical influences and ensure air-flow to the temperature sensors which is substantially undisturbed.

Claim 19 (new). The fire detector of claim 1, further comprising an alarm module having an acoustic alarm emitter arranged in a separate housing offset from the housing of the fire detector.

Claim 20 (new). The fire detector of claim 6, further comprising an alarm module having an acoustic alarm emitter arranged in a separate housing offset from the housing of the fire detector.